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**Before the  
Federal Communications Commission  
Washington, DC 20554**

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**MAR 19 2001**

In the Matter of )

Nondiscrimination in the Distribution )  
of Interactive Television Services )  
Over Cable )

CS Docket No. 01-7

**FEDERAL COMMUNICATIONS COMMISSION  
OFFICE OF THE SECRETARY**

**COMMENTS OF THE  
NATIONAL ASSOCIATION OF BROADCASTERS**

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## **Executive Summary**

The National Association of Broadcasters (“NAB”) submits these comments in response to the *Notice of Inquiry* seeking comment on various issues surrounding the distribution of interactive television (“ITV”) services over cable platforms. NAB urges the Commission to act now to establish a clear policy to prevent cable operators from discriminating among ITV service providers and content.

NAB initially points out that narrowband Internet services have flourished because of an “end-to-end” architecture that is open and nondiscriminatory and that, consequently, promotes innovation and consumer choice. The Commission should act to insure that broadband services, including ITV, remain similarly competitive, accessible and devoid of entry barriers. Establishment of a clear nondiscrimination policy for ITV services is also not premature. These services are developing rapidly and are expected to become a multi-billion dollar business in the near future. Commission action now would additionally forestall the need for more intrusive governmental regulation later to deal with gatekeeper-related problems in the ITV market.

Commission action promoting the availability of consumer choice in ITV services and reasonable access for all ITV providers to the distribution platform controlled by cable operators would also be entirely consistent with congressional goals expressed in the 1996 Telecommunications Act and the 1992 Cable Act. The Commission has also recognized cable’s continuing dominant position in the analog multichannel video programming distribution market, and NAB stresses the need for Commission action to prevent the leveraging of cable’s market power in the analog world into the broadband digital environment. In particular, vertically integrated cable

operators (*i.e.*, those with interests in ITV service providers) will have the ability and the incentive to exercise gatekeeper control through their distribution systems to the detriment of unaffiliated ITV service providers. But NAB believes that even non-vertically integrated cable operators will be able to exercise inordinate influence over the offering of ITV services, given the absence of other competitively viable platforms for delivering the full range of ITV services, and the ability of cable operators in a digital environment to control the creation of electronic program guides (“EPGs”). The Commission should accordingly make nondiscrimination standards applicable to *all* cable operators making ITV services available to consumers.

For the above-described reasons, NAB urges the Commission to begin now to develop clear nondiscrimination guidelines for ITV services. In making the general principle of nondiscrimination operational, NAB initially stresses the importance of not defining ITV too narrowly, so that ITV services are deemed to include both those that require a return path and those that do not. Indeed, a very powerful mechanism available to cable operators in the digital environment for engaging in discriminatory conduct will be the EPG, an interactive service that does not require a return path.

In implementing nondiscrimination standards, the Commission must also recognize the significant differences between the delivery of ITV services in an analog environment and in a digital environment, and consider the adoption of standards specific to each. Unlike analog, the delivery of digital ITV services to consumers will require a mechanism for associating all of the elements – video, audio and data – comprising any interactive service. To make a nondiscrimination policy effective in the digital environment, the Commission will therefore need to focus on the ability of cable

operators to control, through their creation of EPGs, this association of video, audio and data, which will be the source of considerable market power for those operators. Finally, the Commission must recognize the ability of cable operators to affect, in a myriad of way, the technical quality of the ITV services they distribute. Adoption of nondiscriminatory quality of service standards should accordingly be considered, especially for ITV services requiring a return path. Only by addressing all of these issues in a timely manner will the Commission insure that consumers enjoy nondiscriminatory access to the ITV providers and content of their choice and, ultimately, that the ITV market develops to its fullest potential.

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TO: The Commission

**COMMENTS OF THE  
NATIONAL ASSOCIATION OF BROADCASTERS**

The National Association of Broadcasters (“NAB”)<sup>1</sup> submits these comments in response to the Commission’s *Notice of Inquiry* in this proceeding.<sup>2</sup> In the *Notice*, the Commission sought comment on various issues surrounding the distribution of rapidly developing interactive television (“ITV”) services over cable platforms. In particular, the *Notice* inquired about the superiority of the modern cable television plant as a platform for the distribution of ITV services, and the need to prohibit at least vertically integrated cable operators from discriminating among ITV service providers. The Commission also sought comment on how to define ITV services and how to make the principle of nondiscrimination operational.

NAB urges the Commission to establish a policy of nondiscrimination for ITV access. Narrowband Internet services have flourished because of an “end-to-end” architecture that is open and nondiscriminatory. The Commission should act to ensure that broadband services,

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<sup>1</sup> NAB is a nonprofit, incorporated association of television and radio stations and broadcast networks which serves and represents the American broadcast industry.

<sup>2</sup> *Notice of Inquiry* in CS Docket No. 01-7, FCC 01-15 (rel. Jan. 18, 2001) (“*Notice*”).

including ITV, remain similarly competitive, accessible and devoid of entry barriers.

Establishment of a clear nondiscrimination policy for ITV services is also not premature, as these services are rapidly developing and FCC action now will forestall the need for more intrusive regulation later to deal with gatekeeper-related problems in the ITV market.

A nondiscrimination policy would promote the availability of choice in ITV services for consumers and reasonable access for ITV providers unaffiliated with the cable operator controlling the distribution platform. These goals are entirely consistent with congressional goals, as expressed in the 1996 Telecommunications Act and the 1992 Cable Act, and with Commission policies, as reflected in nondiscrimination and access conditions previously placed on specific mergers. The Commission has also recognized cable's continuing dominant position in the multichannel video programming distribution market, and NAB stresses the need for Commission action to prevent the leveraging of cable's market power in the analog world into the broadband digital environment. In particular, vertically integrated cable operators (*i.e.*, those with interests in ITV service providers) will have the ability and the incentive to exercise gatekeeper control through their distribution systems to the detriment of unaffiliated ITV service providers. But NAB believes even non-vertically integrated cable operators will be able to exercise inordinate influence over the offering of ITV services, given the absence of other competitively viable distribution platforms for ITV services and the ability of cable operators in a digital environment to control the creation of electronic program guides.

For these reasons, NAB urges the Commission to begin now to develop clear nondiscrimination guidelines for ITV services. As an initial matter, NAB stresses the importance of not defining ITV too narrowly, so that ITV services are deemed to include both those that require a return path and those that do not. Indeed, a very powerful mechanism



available to cable operators in the digital environment for engaging in discriminatory conduct will be the electronic program guide, an interactive service that does not require a return path.

In implementing nondiscrimination standards, the Commission must also recognize the significant differences between the delivery of ITV services in an analog environment and in a digital environment, and consider the adoption of standards specific to each. Unlike analog, the delivery of digital ITV services to consumers will require a mechanism for associating all of the elements – video, audio and data – comprising any interactive service. To make a nondiscrimination policy effective in the digital environment, the Commission will therefore need to focus on the ability of cable operators to control, through their creation of electronic program guides, this association of video, audio and data, which will be the source of considerable market power for those operators. Finally, the Commission must also consider the ability of cable operators to affect, in a myriad of other ways, the technical quality of the ITV services they distribute. Only by addressing all these issues in a timely manner will the Commission insure that consumers enjoy nondiscriminatory access to the ITV providers and content of their choice and, ultimately, that the ITV market develops to its fullest potential.

## **I. The Commission Must Establish A General Policy Of Nondiscrimination For ITV Access.**

### **A. The Development of Narrowband Internet Demonstrates the Importance of Nondiscriminatory Access.**

Virtually all observers agree that narrowband Internet has flourished because of its “openness.”<sup>3</sup> Specifically, the narrowband Internet has an “end-to-end” architecture that

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<sup>3</sup> See, e.g., *Trying to Connect You*, The Economist at 69 (June 24, 2000) (article observed that the “success of the Internet has shown the value of open standards and a neutral platform on which everybody can compete on equal terms. Had the Internet been dominated by any one company, it would not be where it is today.”); *No Chokeholds Allowed*, Los Angeles Times, Metro Section (Sept. 22, 2000) (editorial commented that “openness” has been the “key” to the Internet’s

maintains a simple, nondiscriminatory network with intelligence placed in the networks' applications, or "ends" of the system. One primary benefit resulting from this architecture is innovation. Because a neutral network cannot discriminate against new applications or content, the burden placed on innovation is kept small, and, consequently, innovation booms.<sup>4</sup> Moreover, the government has played a significant role in insuring the openness of narrowband Internet by breaking up the AT&T telephone monopoly and imposing nondiscrimination and access requirements on the telephone networks. Because of this governmental action, consumers of telephone service have always had the right to select the Internet service provider ("ISP") of their choice, rather than the ISP favored by any telephone company, and considerable competition developed among ISPs.<sup>5</sup>

For the ITV market to flourish as narrowband Internet has done, the government must similarly act to insure that consumers have nondiscriminatory access to the ITV providers and content of their choice, rather than just the ITV services favored by the cable company that owns the distribution network. If this principle is not established, then the cable companies controlling the ITV distribution system will behave "just as every network owner in history has behaved" –

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success and that it "should stay that way"); Jerome H. Saltzer, "*Open Access*" is Just the Tip of the Iceberg (Oct. 22, 1999) at <http://mit.edu/Saltzer/www/publications/openaccess.html> (Internet is now "being used in ways completely undreamed of at the time of its design" because of its open design principle).

<sup>4</sup> A number of articles discuss the importance for innovation of the Internet's open, end-to-end architecture. See, e.g., Saltzer, *Open Access*; L. Lessig, *Innovation, Regulation, and the Internet*, The American Prospect Online (March 27-April 10, 2000).

<sup>5</sup> See, e.g., Ex Parte Comments of Professors Mark A. Lewley and Lawrence Lessig, *Application for Consent to the Transfer of Control of Licenses from MediaOne Group, Inc. to AT&T Corp.*, CS Docket No. 99-251 at 11-14 ("It is no accident that the Internet was born in the United States, since in practically every other nation, the telephone architecture was controlled by state sponsored monopolies.").

they will “control access and use architecture to minimize competition.”<sup>6</sup> If the Commission wishes that the “dynamism that has characterized the Internet” to also characterize ITV, then the Commission will need to “ensure” that ITV services “remain competitive, accessible, and devoid of entry barriers.”<sup>7</sup> And, clearly, the best way to ensure competitiveness, innovation and meaningful choice for consumers, is to establish a clear policy of nondiscrimination for ITV access so that cable operators cannot discriminate among ITV service providers and content.<sup>8</sup>

**B. Establishing a Clear Nondiscrimination Policy for ITV Would Not Be Premature.**

The Commission should also not be concerned that it is “too soon” to establish a general policy of nondiscriminatory access for ITV service and content providers. *See Notice* at ¶ 20 (inquiring whether the ITV services market was “too nascent for Commission action”). ITV is expected to “reach a critical mass of users and blossom into a multi-billion dollar business over the next 3-5 years.” *Interactive Television Outlook 2000* at 81. More specifically, research firms have estimated that by 2004, nearly 30 million households in the U.S. (or 27 percent of the total)

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<sup>6</sup> Lessig, *Innovation, Regulation, and the Internet* at 5. Indeed, the Internet customers of cable companies have already reported a number of examples of “gatekeeping.” *See, e.g.,* Saltzer, *Open Access* (reporting five examples of gatekeeping by cable companies providing Internet access); L. Lessig, *Will AOL Own Everything?*, *Time* at 106 (June 19, 2000) (because, unlike telephone companies, cable companies are allowed to discriminate, they can “block services they don’t like,” and “many” already “limit the streaming of video to computers,” while “charging a premium for streaming video to televisions”).

<sup>7</sup> *Memorandum Opinion and Order, Application of WorldCom, Inc. and MCI Communications Corporation for Transfer of Control of MCI Communications Corporation to WorldCom, Inc.*, 13 FCC Rcd 18025, 18103-104 (1998).

<sup>8</sup> *See, e.g.,* D. Carney, *The FTC Should Open the Broadband Gates*, *Business Week* at 46-48 (Oct. 23, 2000) (FTC or FCC must “develop an industrywide policy for open access” so that “the broadband Internet and interactive television remain open to competition – and free of stifling monopolies”); Myers Mediaenomics, *Interactive Television Outlook 2000* at 19 (June 2000) (“ITV observers” have “recognize[d] that the industry is unlikely to fully succeed without an open technological platform”).

will use ITV features, primarily via digital cable, and that ITV will rival the Internet as an advertising medium within three years.<sup>9</sup> Other analysts have estimated that, by 2005, ITV “will be a \$40 billion market, generating revenues on everything from advertising to subscriptions to video-on-demand.”<sup>10</sup> ITV has been developing even more rapidly in Europe, especially in Great Britain.<sup>11</sup>

Given the expected rapid development of ITV services, the question for the Commission is not whether, but when, it will be compelled to address in the ITV context competitive issues arising from cable’s gatekeeper role. Prompt action by the Commission to establish a pro-competitive foundation for broadband services, including ITV, would not only promote the rapid development of ITV services, but would also forestall the need for greater government oversight or intervention in the future to undo entrenched interests in the ITV market. Numerous commenters in other Commission proceedings – and the Commission itself – have recognized the inefficiencies and greater costs associated with such “ex post” regulation.<sup>12</sup> Indeed, the old

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<sup>9</sup> A. Stone and S. Eads, *Interactive TV’s Really Big Picture*, Business Week Online (Sept. 7, 2000) (citing estimates from Jupiter Communications and Forrester Research).

<sup>10</sup> R. Grover, T. Lowry and L. Armstrong, *TV Guy*, Business Week at 68 (March 12, 2001).

<sup>11</sup> K. Freed, *UK & Europe Lead in Interactive TV*, Media Visions Webzine at <http://www.media-visions.com/itv-europe.html> (2000) (over next five years, ITV penetration in Europe expected to grow from today’s 15-20 percent to 60 percent and eventually 90 percent penetration).

<sup>12</sup> See, e.g., Comments of America Online, Inc. in CS Docket No. 98-178 at v; 24 (Oct. 29, 1998) (in comments on the merger of AT&T and Tele-Communications, Inc., commenter stated that the “history of cable regulation demonstrates” that “the failure to act now” with regard to broadband Internet access will “require policymakers to pursue broader, more detailed intervention in the future” to address anticompetitive conduct by cable operators); Comments of Lewley and Lessig in CS Docket No. 99-251 at 38 (in comments addressing the question of Internet open access in the context of the MediaOne and AT&T merger, commenters stated that the government is not “in a position to intervene to undo excess monopoly power in an efficient and expeditious manner” and that “the costs of dislodging an existing monopoly power are always significant, and always higher ex post”); *Memorandum Opinion and Order* in CS Docket No. 00-30, FCC 01-12 at ¶ 15 (rel. Jan. 22, 2001) (“AOL/TW Order”) (in reviewing America

adage “an ounce of prevention is worth a pound of cure” seems remarkably apt in this situation, as industry observers have noted the dangers of regulators adopting a “wait-and-see attitude” while individual companies are “establish[ing] the architecture of the broadband world right now.”<sup>13</sup> Establishing clear nondiscrimination standards now would also allow broadband providers to construct or upgrade their systems to be consistent with the Commission’s “rules of the road.”

Moreover, a clearly established national policy of nondiscriminatory access for ITV providers and content should encourage the more rapid development of innovative ITV services. *See Notice* at ¶ 20 (asking whether FCC rules would promote ITV services). If ITV service and content providers are assured of a “clear and uninterrupted path to the ultimate consumer free of any potential disruption or discrimination” by cable gatekeepers,<sup>14</sup> then these entities have greater incentives to invest in and develop new and innovative ITV services. A uniform national policy – as opposed to a patchwork of differing state and local policies – establishing a

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Online and Time Warner merger, FCC observed that “some degree of timely intervention to preserve competition may avoid a later need for more onerous intervention to either regulate where competition has disappeared or to attempt to reintroduce competition once it has been eliminated”).

<sup>13</sup> B. McConnell, *Ties that Bind?*, *Broadcasting & Cable* at 51 (July 10, 2000) (industry observers asserting that delay in addressing broadband and ITV access issues is “very dangerous” because it would be “extremely difficult to unwind” the structure established “several years down the road”). Cable operators are also currently deploying set-top boxes containing electronic program guides so that consumers will use the cable operator’s (rather than a competitor’s) program guide. As discussed in detail below, control of the electronic program guide will greatly increase the cable operator’s market power and ability to discriminate in the digital world.

<sup>14</sup> *The Future of the Interactive Television Services Marketplace: What Can the Consumer Expect?*, Hearing Before the Subcomm. on Telecommunications, Trade and Consumer Protection of the House Commerce Committee (Sept. 27, 2000) (statement of Representative Rick Boucher) (“*Interactive TV Hearing*”).

foundation of nondiscriminatory access would end the “uncertainties” and “disparities” currently associated with the offering of ITV services, and help insure their success in the marketplace.”<sup>15</sup>

**C. A Nondiscrimination Policy for ITV Services Will Not Discourage Investment in ITV or in the High Speed Platform Needed for Distribution of Those Services.**

For the reasons described above, the establishment of a general nondiscrimination policy for ITV service and content providers will promote investments in those services by entities who no longer fear discriminatory treatment by cable platform owners favoring their own (or affiliated entities’) ITV services. The Commission should also reject any arguments offered by cable operators that they will be reluctant to invest in the high-speed broadband platforms best suited for distribution of ITV services unless they can exercise gatekeeper control over competing ITV service and content providers seeking access to their distribution platforms. *See Notice* at ¶ 20 (asking whether FCC rules would promote or restrict capital investments in ITV services).

There is, in fact, little reason to believe that an ITV nondiscrimination requirement would eviscerate cable operators’ incentive to invest in broadband infrastructure. Cable operators will continue upgrading their distribution systems so as to be able to provide many other services, including cable modem service, digital cable, pay-per-view services, and video-on-demand. In addition, economists and other experts have rejected as “blackmail” claims by cable interests that a general open access requirement would prevent them from building their broadband

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<sup>15</sup> During last fall’s *Interactive TV Hearing*, Representative Rick Boucher, a recognized expert on Internet policy matters, stated that the “time has come to end the disparities, to end the uncertainties, and to assure content providers access for interactive TV by making open access the uniform national policy, and to make it applicable to all Internet transport platforms.”

networks.<sup>16</sup> For similar reasons, the Commission should not be concerned that an ITV nondiscrimination policy would inhibit the development of either ITV services or the broadband platform to distribute those services. In particular, the Commission should be skeptical of any threat based on the premise that removing a network owner's "ability to capture *supranormal* economic profits will necessarily eliminate the provider's incentive to deploy or develop new technology."<sup>17</sup>

**D. Nondiscrimination Policies Have Already Been Approved in the Context of Specific Mergers, and Should Be Given General Application.**

The Commission should, moreover, not regard the adoption of a general nondiscrimination policy for ITV services to represent any sort of radical departure from its current policy. In recently approving the merger of America Online, Inc. ("AOL") and Time Warner, Inc. ("TW"), the Commission expressly concluded that the combined AOL/TW would have the ability and incentive to discriminate against unaffiliated video programming networks in the provision of ITV services. *See AOL/TW Order* at ¶ 217. The Commission noted, however, that the Federal Trade Commission ("FTC"), in its review of the AOL/TW merger, had already ordered that AOL/TW not discriminate in the transmission and carriage of content

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<sup>16</sup> *See, e.g.,* L. Lessig, *Cable Blackmail*, The Standard.com (Nov. 14, 1999) ("Cable's response to open-access arguments is blackmail . . . no monopoly was needed to build the Internet, and one isn't needed to build broadband access"); Comments of America Online in CS Docket No. 98-178 at Attachment B (MIT economist opined that cable companies' arguments against a broadband open access requirement did "not make economic sense" and that investment incentives would still exist for cable companies to upgrade their networks); Comments of Lemley and Lessig in CS Docket No. 99-251 at 36 (in rejecting cable companies' arguments that open access will retard investment in broadband, commenters contended that these arguments were "simply wrong as a matter of economics" because incentives to build broadband would still exist).

<sup>17</sup> Comments of America Online in CS Docket No. 98-178 at 36 (refuting arguments by cable companies that investment in broadband facilities would occur only if the cable companies were allowed to deal exclusively with their affiliated ISPs).

(including interactive signals and triggers) that it agreed to carry, and had forbidden AOL/TW from blocking or otherwise interfering with interactive content transmitted by an unaffiliated ISP. *Id.* at ¶ 242. In light of these FTC actions, the Commission declined to impose another condition on the merger concerning interactive content providers that did “not apply industry-wide.” *Id.*

But now the time has come for the Commission to extend requirements adopted in the context of specific mergers to an “industry-wide” policy concerning nondiscriminatory access for ITV service and content providers. There is no reason for only the cable customers of the combined AOL/TW to benefit from open access and/or nondiscrimination policies.<sup>18</sup> After all, the majority of U.S. cable users are not customers of AOL/TW and, like Time Warner, “every other cable company in the country has the same power to bully its customers.”<sup>19</sup> The Commission should accordingly act to insure that all Americans enjoy nondiscriminatory access to the ITV providers and content of their choice, even if not affiliated with the cable operator controlling the distribution platform.<sup>20</sup>

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<sup>18</sup> In their orders reviewing the AOL/TW merger, both the FTC and FCC also adopted open access requirements with regard to the Internet services offered by unaffiliated ISPs.

<sup>19</sup> Carney, *The FTC Should Open the Broadband Gates* at 46 (article contending that industry-wide policy is needed, because imposing conditions on mergers such as AOL/TW is insufficient to insure that consumer access to broadband Internet and ITV services remains open). As discussed in more detail below, cable operators generally remain dominant in their local multichannel video programming distribution markets.

<sup>20</sup> NAB notes that a nondiscrimination policy would also treat all competitors in the ITV market equally. Rather than just imposing nondiscrimination conditions on companies that are involved in certain mergers, a general nondiscrimination policy would apply equally to all cable operators, so that all are competing under the same conditions.



## **II. A General Policy Of Nondiscrimination For ITV Access Would Clearly Further Congressional Goals And Long-Standing Commission Policies.**

A nondiscrimination policy prohibiting cable operators from discriminating among ITV service providers would (1) promote the availability of choice in ITV services and content for consumers, and (2) provide reasonable access to consumers for ITV providers unaffiliated with the cable operator controlling the distribution platform. The goals are entirely consistent with congressional goals expressed in the 1996 Telecommunications Act and in the 1992 Cable Act, as well as with the long-standing goal of the Commission to promote competition to wired cable in the multichannel video marketplace.

### **A. Congress Has Enacted Major Legislation Directly Addressing Competitive Problems Created by Cable Operators' Market Power.**

In the Telecommunications Act of 1996 ("1996 Act"), Congress intended to "remove the outdated barriers" that had protected the local telephone and cable television "monopolies from competition and affirmatively promote efficient competition" across the full range of telecommunications services.<sup>21</sup> In the words of Representative Billy Tauzin, Chairman of the House Energy and Commerce Committee, assuring that consumers "have a meaningful choice in what interactive television services they receive" is an interest "[c]onsistent with the '96 Act." *Interactive TV Hearing*, Opening Statement of Representative Tauzin. Because the 1996 Act "reflects a clear preference that competitive markets . . . be created and preserved," *AOL/TW Order* at ¶ 15, the Commission should adopt a general policy of nondiscrimination for ITV access so as to "create" and "preserve" a competitive marketplace for ITV services and content.

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<sup>21</sup> M. I. Meyerson, *Ideas of the Marketplace: A Guide to The 1996 Telecommunications Act*, 49 Fed. Comm. L. J. 251, 253, 287 (1997). See also H. R. Rep. No. 204, 104th Cong., 2d Sess. 48 (1996) (telecommunications bill was designed to "promote competition in the market for local telephone service" and to "spur[] competition in the multichannel video market").

Even more directly than the 1996 Act, the Cable Television Consumer Protection and Competition Act of 1992 (“Cable Act”) addressed problems arising from the lack of competition in the multichannel video programming distribution (“MVPD”) market. *See* Section 2(a) of Cable Act, note following 47 U.S.C. § 521. In particular, Congress found in the Cable Act that most consumers “have no opportunity to select between competing cable systems” and that cable systems generally face “no local competition.” As a result, cable operators have “undue market power” as “compared to that of consumers and video programmers.” Section 2(a)(2) of Cable Act, 47 U.S.C. § 521 nt. To remedy these competitive imbalances, Congress adopted a number of requirements providing for, *inter alia*, the carriage of local broadcast station signals by cable operators and access to programming by aspiring competitors to cable companies. Thus, just as Congress in 1992 acted to increase programming choices for cable consumers and to provide reasonable access to programming by cable’s competitors, the Commission should act now to promote ITV programming choices for consumers and to insure nondiscriminatory access for ITV service and content providers to the cable distribution platform. Both congressional action then, and Commission action now, would be entirely appropriate responses to address competition problems arising from the cable operators’ role as gatekeeper in the analog MVPD market and in the digital broadband market.<sup>22</sup>

**B. The Commission Has Long Been Concerned with the Dominant Market Position of Cable Operators.**

Above all, the Commission must insure that cable operators do not leverage their existing power in the MVPD market into the markets for new services, including ITV. The Commission

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<sup>22</sup> Moreover, the Commission need not “wait until the entire harm occurs but may act to prevent it.” *Turner Broadcasting System, Inc. v. FCC*, 520 U.S. 180, 212 (1997) (explaining that Congress was “under no obligation to wait” before acting to protect the broadcast industry “from economic harm threatened by a monopoly”).

has documented on many occasions the continuing dominant position of cable in the MVPD market. For example, in the most recent cable competition report, the Commission found that cable was still the “dominant technology for the delivery of video programming to consumers in the MVPD marketplace” and that cable rates were still rising “faster than inflation.”<sup>23</sup> In addition, the Commission concluded that “most consumers have limited choices among video distributors” and that, “[o]f the 33,000 cable community units nationwide, 330, or 1 percent, have been certified by the Commission as having effective competition as a result of consumers having a choice of more than one MVPD.” *Cable Competition Report* at ¶ 138.<sup>24</sup>

Clearly, cable operators retain a dominant position in the MVPD marketplace, which is still characterized by lack of consumer choice and barriers to entry for potential competitors. Unless the Commission acts, the existing market power of cable operators could easily be leveraged into the digital environment, thereby extending cable’s dominance into ITV and other emerging broadband services. The ability and predisposition of cable operators to extend their dominant position into the broadband world is shown by the terms on which they offer Internet access to consumers via cable modems. Unlike high-speed Internet access offered through a telephone company where the customer can select the ISP of his or her choice, the cable ISP “is selected by the cable provider” and “most cable operators offer only one ISP to customers” in a given cable system. Moreover, “[m]ost cable providers hold interest[s] in the chosen ISP and

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<sup>23</sup> *Seventh Annual Report, Annual Assessment of the Status of Competition in the Market for the Delivery of Video Programming*, CS Docket No. 00-132, FCC 01-1 at ¶¶ 5, 9 (rel. Jan. 8, 2001) (“*Cable Competition Report*”).

<sup>24</sup> This recent report also found that the “market for the delivery of video programming to households continues to be highly concentrated and characterized by substantial barriers to entry which serve to increase the costs of potential entry into a rival’s market.” *Cable Competition Report* at ¶ 137.

also provide proprietary content to that ISP.” *Cable Competition Report* at ¶ 49 and n. 166.

There is no reason to believe that cable operators would act any differently when it comes to the provision of ITV services to consumers over their upgraded cable platforms. And if cable is allowed to leverage its market power in the analog MVPD market into the world of digital broadband services, including ITV, then the familiar pattern of higher prices, lower quality of service, and restricted consumer choice would be extended as well.

As the Commission contemplated in the *Notice* (at ¶ 21), existing statutory and rule provisions could readily be utilized as the general regulatory template for nondiscrimination provisions applicable to ITV services. For example, Section 628(b) of the Communications Act of 1934, 47 U.S.C. § 548, makes it unlawful for “a cable operator” to “engage in unfair methods of competition or unfair or deceptive acts or practices, the purpose or effect of which is to hinder significantly or to prevent any multichannel video programming distributor” from providing certain programming to subscribers or consumers. Using Section 628 as a model, the Commission could consider prohibiting cable operators from engaging in unfair methods of competition or unfair or deceptive acts or practices intended to hinder or prevent an ITV service provider from providing ITV programming or content to subscribers or consumers. Similarly, Section 616 of the Communications Act, 47 U.S.C. § 536, directs the Commission to prevent, *inter alia*, (1) cable operators “from requiring a financial interest in a program service” as a condition for carriage on the operators’ systems, and (2) multichannel video programming distributors from engaging in discrimination on the basis of selection, terms or conditions for carriage of video programming, “the effect of which is to unreasonably restrain the ability of an unaffiliated video programming vendor to compete fairly.” The Commission could accordingly

be guided by these provisions in considering how to formulate a nondiscrimination provision in the ITV context.<sup>25</sup>

However the Commission chooses to implement a general policy of nondiscrimination for ITV access, one point is clear. If ITV services are to develop to their fullest potential, the Commission must prevent cable operators from leveraging their dominant position in the MVPD market into a similarly dominant position in the market for newer services, including ITV. As has been noted, one danger presented by the 1996 Act “is that existing monopolies, such as the BOCs or cable operators, will leverage their current power either to gain an unfair advantage in a competitive market, or to retain their advantage in the local arena.” Meyerson, *Ideas of the Marketplace* at 287. This danger “will have to be averted in order for the [1996] Act to be successful,” *id.*, and the Commission should help assure the success of the 1996 Act by preventing the leveraging of cable operators’ current power in the MVPD market into the market for ITV and other broadband services.

### **III. The Commission Should Make Nondiscrimination Standards Applicable To All Cable Operators Making ITV Services Available To Consumers.**

#### **A. Vertically Integrated Cable Operators Have Both the Incentive and Ability to Discriminate Against Unaffiliated ITV Service and Content Providers.**

The Commission hypothetically assumed in the *Notice* (at ¶ 21) that vertically integrated “cable operators are likely to have the incentive and the ability to favor affiliated ITV service providers over non-affiliated ones.” NAB believes the Commission’s assumption to be correct, and, as a result, the Commission should, at the very least, prohibit vertically integrated cable

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<sup>25</sup> See Section IV. below for a more detailed discussion of the factors that the FCC should consider in making the principle of “nondiscrimination” operational.

operators (*i.e.*, those with attributable interests in ITV service providers) from discriminating among ITV service providers.

The capability and incentive of cable operators to favor affiliated programming and services – and to disfavor unaffiliated content and services – has been recognized by Congress, the courts, the Commission, and industry observers alike. In the Cable Act, Congress expressly found that vertically integrated “cable operators have the incentive and ability to favor their affiliated programmers,” thereby making “it more difficult for noncable-affiliated programmers to secure carriage on cable systems.” Section 2(a)(5) of Cable Act, 47 U.S.C. § 521 nt. The courts have also recognized that entities owning both distribution systems and content have a particularly strong incentive to disfavor unaffiliated content providers seeking distribution to consumers.<sup>26</sup> Certainly cable operators have on a number of occasions illustrated their ability and incentive to discriminate against unaffiliated service and content providers trying to obtain distribution to consumers.<sup>27</sup> Indeed, the Commission itself recently recognized the harms to consumers likely to result from the ability and incentive of the combined AOL/TW to discriminate against unaffiliated ISPs on its cable network and against unaffiliated video programming networks in the provision of ITV services. *See AOL/TW Order* at ¶¶ 86, 217.

This predisposition of cable operators to favor affiliated service and content providers should come as no surprise because, as discussed in Section I. above, “every network owner in

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<sup>26</sup> *See, e.g., Time Warner Entertainment Co., L.P. v. U.S.*, 211 F.3d 1313, 1322 (D.C. Cir. 2000) (a cable operator has the “incentive to favor its affiliated programmers” and such an “operator may, as a rational profit-maximizer, compromise the consumers’ interests”).

<sup>27</sup> For example, last year the Commission found that Time Warner’s removal of the signals of ABC-owned television stations from Time Warner’s cable systems during a “sweeps” rating period violated the Communications Act and Commission rules. *See Memorandum Opinion and Order*, DA 00-987 (rel. May 3, 2000).

history” has acted to “control access” and otherwise “minimize competition.”<sup>28</sup> Based on the well-documented past behavior of vertically integrated network owners generally, and cable operators specifically, there can be no reason to expect that cable operators with interests in ITV service providers will refrain from discriminating against unaffiliated ITV services and content. Thus, the Commission must, at the least, adopt a clear policy prohibiting vertically integrated cable operators from discriminating among ITV service and content providers.

**B. Even Non-Vertically Integrated Cable Operators Will Be Able to Exercise Market Power in the ITV Market, Given the Superiority of Cable as a Distribution Platform and the Ability of Cable Operators in a Digital Environment to Control the Creation of Electronic Program Guides.**

NAB also urges the Commission to prohibit all cable operators that make ITV services available to consumers from discriminating among ITV service and content providers, whether or not the cable operator has an attributable interest in any ITV service provider. Because there are no other competitively viable distribution platforms for delivering the full range of interactive services, cable operators (whether vertically integrated or not) will be able to exercise inordinate influence over the distribution of ITV services and content to consumers. In addition, the ability of cable operators in a digital environment to control, through their creation of electronic program guides, the association of all the elements (*e.g.*, video, audio and data) comprising any interactive service will be the source of considerable market power in the ITV marketplace. All cable operators should accordingly be prohibited from exercising this power in

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<sup>28</sup> Lessig, *Innovation, Regulation, and the Internet* at 5. See also *The Slow Progress of Fast Wires*, *The Economist* at 57-58 (Feb. 17, 2001) (in article discussing British Telecom’s interest in frustrating the government’s ambition to speed broadband deployment, one industry observer noted the difficulties faced by regulators in “adequately restrain[ing] the commercial imperatives of a vertically integrated incumbent”).

a discriminatory manner, as it has been recognized that cable systems have “systemic reasons” for discriminating against competitors, regardless of the existence of any vertical relationships.<sup>29</sup>

The Commission recognized in the *Notice* (at ¶ 20) that the cable platform may have “significant advantages in providing ITV services.” NAB agrees with this assessment. Other platforms suffer from a variety of technical drawbacks that make them unsuited to delivering the full range of interactive services (especially “two-way” services requiring a return path) on a commercially viable basis. For example, digital subscriber lines (“DSL”) are essentially only a higher speed version of current modems. DSL consequently suffers from insufficient upstream and downstream bandwidth and cannot match cable’s capacity to carry multiple channels of full motion television programming. In addition, DSL is available only to those customers who live in close proximity to telco switching facilities, and is therefore simply unavailable to large numbers of consumers. Direct Broadcast Satellite (“DBS”) is not currently suitable for a number of high-speed two-way interactive applications because it depends on telephone lines for the return path. “Although satellite providers are working to address this deficiency, two-way high-speed transmission facilitated by satellite may not be widely available for several years.” *AOL/TW Order* at ¶ 66.<sup>30</sup> Similarly, while a narrowband Internet connection (*i.e.*, a dial-up telephone connection) could provide the two-way connection necessary to provide a number of interactive services, it cannot “provide the speed and bandwidth” that a cable broadband platform would provide. *Id.* at ¶ 225.

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<sup>29</sup> *Turner Broadcasting System, Inc. v. FCC*, 520 U.S. 180, 201-202 (1997) (cable systems have the incentive to disadvantage broadcast competitors “in favor of programmers – even *unaffiliated* ones – less likely to compete with them for audience and advertisers”) (emphasis added).

<sup>30</sup> Given this delay, cable operators may be able to build an almost insurmountable lead in the ITV market before DBS could become a viable competitor.



Especially in contrast to the deficiencies of these other platforms described above, “cable facilities provide the optimal platform for the delivery of ITV services.” *Id.* at ¶ 222. The cable platform has the upstream and downstream bandwidth to provide the high-speed connection necessary for the full range of ITV services, including those requiring a return path. In addition, cable passes almost all homes in the U.S. and has been the dominant distribution vehicle for multichannel video programming for some years, thereby giving it an obvious “head start” in the market for providing ITV services.<sup>31</sup> Because cable is clearly the “optimal platform,” *AOL/TW Order* at ¶ 222, for the delivery of ITV services (especially those requiring a return path), and no other competing platform may be commercially viable at least for the near future, cable operators will likely exert considerable power in the ITV distribution market. Just as cable operators exert “undue market power” in the MVPD market “[w]ithout the presence of another multichannel video programming distributor,” Section 2(a)(2) of Cable Act, 47 U.S.C. § 521 nt, cable operators that face no competition in the ITV market from other distributors will possess “undue market power.”<sup>32</sup>

Beyond the market power conveyed by the absence of a competitive distribution platform, cable’s power in the ITV marketplace will also be greatly enhanced by the ability of cable operators to control the creation of electronic program guides (“EPGs”) in the digital environment. As explained in detail below, cable operators will “associate” all the elements

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<sup>31</sup> Cable passes 96.6 percent of the total number of television households in the U.S. The number of cable subscribers grew to 67.7 million as of June 2000, and 80% of all MVPD subscribers receive their video programming from a franchised cable operator. *Cable Competition Report* at ¶¶ 5, 7, 18.

<sup>32</sup> See also *Time Warner Entertainment Co., L.P. v. FCC*, No. 94-1035 (March 2, 2001) (a “company’s ability to exercise market power” depends on “its share of the market” and “also on the elasticities of supply and demand, which in turn are determined by the *availability of competition*”) (emphasis added).

needed for digital ITV services (*e.g.*, the video, audio and interactive data) through their creation of EPGs, which will consequently become a very powerful mechanism for cable operators to favor or disfavor whatever interactive content and services they choose. *See infra* Section IV. Indeed, cable operators will be able to exercise significant market power in the digital ITV marketplace through their control of EPGs alone.

NAB therefore urges the Commission to make any nondiscrimination policies adopted applicable to all cable operators, not just to those with attributable interests in ITV service providers. As described above, cable will likely remain the sole competitively viable platform for the distribution of two-way ITV services for the foreseeable future, and cable operators will also be able to disrupt the association of the elements comprising digital ITV services and control the creation of EPGs for those services. Cable operators will consequently have a true “bottleneck monopoly” that constitutes “a physical and economic barrier” to competition in the ITV marketplace. *Time Warner Entertainment Co.*, 211 F.3d at 1321. The Commission must act now to prevent such “bottlenecks” – whether caused by vertically integrated or non-vertically integrated cable operators – from inhibiting competition.<sup>33</sup> Not only would consumer choice be severely restricted in an ITV market dominated solely by the interactive services and content favored by the cable gatekeepers, but the “substantial governmental” interest “in promoting a diversity of views” would be compromised. Section 2(a)(6) of Cable Act, 47 U.S.C. § 521 nt.

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<sup>33</sup> *See Turner Broadcasting*, 520 U.S. at 201-202 (even in the absence of any vertical relationships, cable operators may seek to disadvantage competitors who are the most “likely to compete with them for audience and advertisers”). Also, operators may have financial incentives to advantage cable-only ITV services, even though they may have no attributable ownership interests in such services.

#### **IV. The Commission Must Consider A Number Of Factors In Making The Principle Of Nondiscrimination Operational In The Analog And Digital Environments.**

##### **A. The Commission Must Define ITV to Include Services That Do Not Require a Return Path.**

In considering how to make the principle of nondiscrimination operational, the Commission initially requested comment on the definition of ITV services. The *Notice* (at ¶ 6) suggested defining ITV as “a service that supports subscriber-initiated choices or actions that are related to one or more video programming streams.” NAB has no objection to this proposed definition, as the Commission apparently recognized that activating an EPG would be one of these “subscriber-initiated choices” included within the definition of ITV. *See Notice* at ¶ 6. Later in the *Notice*, however, the Commission discussed the three “building blocks” of a distribution system needed to provide ITV, and identified the second building block as a “two-way connection (*e.g.*, via the Internet).” *Notice* at ¶ 12. NAB stresses that ITV must be defined to include interactive services, such as EPGs, that do not require a return path. Specifically, the definition of ITV would be made more precise if the Commission distinguished between one-way (or “reactive”) and two-way (or “transactional”) ITV services.<sup>34</sup>

Defining ITV so as to include services not requiring a return path is essential because a very powerful technical mechanism for discrimination in the digital ITV market will be the EPG, which does not require a return path. In the digital environment, EPGs will be used to establish all the linkages between the various elements (*e.g.*, video, audio and data) of an interactive service and will be the mechanism for presenting an ever-growing number of viewing choices to

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<sup>34</sup> Reactive services, such as EPGs and “drilling down” to access additional information transmitted in the signal, would not require use of a return path. For example, a reactive service might enable a viewer to click on a car in an auto race, or enter its number, to obtain data about that specific car. In contrast, transactional services, such as t-commerce or accessing supplemental information from a web site, would need a return path.

the consumer. *See infra* Section IV.B. & C. If the Commission fails to encompass EPGs and other services not requiring a return path within the definition of ITV, then any nondiscrimination policy applicable to ITV services would not cover EPGs, thereby allowing cable operators to engage in significant discriminatory conduct through their control of the creation of EPGs.<sup>35</sup> Accordingly, NAB urges the Commission to make clear that interactive services not requiring a return path are included within its definition of ITV.

**B. In Formulating Nondiscrimination Standards, the Commission Must Recognize the Significant Differences Between the Delivery of ITV Services in an Analog and in a Digital Environment.**

The *Notice* (at ¶ 10) correctly observed that “some ITV services can be supported by transmissions using the vertical blanking interval of analog video channels.” Although the Commission’s inquiry focused on the “digital transmission scheme that is likely to be able to support high speed ITV services,” the Commission also expressed interest “in the use of analog transmissions for ITV.” *Id.* In considering the formulation of nondiscrimination standards, the Commission must recognize the significant differences between the delivery of ITV services in an analog and in a digital environment, and formulate nondiscrimination policies that are appropriate for each. Indeed, if the Commission attempts to establish generic nondiscrimination standards without taking these differences into account, then the resulting policies may be so broad and vague as to be ineffective in preventing specific discriminatory conduct.

**1. The Delivery of Analog ITV Services Is Relatively Uncomplicated.**

In the analog environment, the interactive enhancement is inherently associated with the television program, as the data for the enhancement is carried on the same composite signal

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<sup>35</sup> The cable operator could also disable with impunity other reactive ITV services, such as by stripping out the interactive data completely or by replacing the original provider’s interactive service or enhancement with one provided by the operator.

(typically in the vertical blanking interval). Consequently, the association of an interactive enhancement with the video and audio program by the ITV device (*e.g.*, the receiver or set-top box) is relatively simple. Indeed, if there is only one ITV enhancement transmitted in an analog signal, then the receiver can recognize it, know that it is associated with the one program, and indicate its availability to the viewer.

If, however, there are two (or more) ITV enhancements transmitted in an analog signal, then the cable operator may be afforded greater opportunity to exert influence over consumer choice. For example, a proprietary set-top box (“STB”) owned by a cable operator might not present multiple ITV enhancements to consumers, but could simply select one of the interactive options or otherwise not indicate the availability of all the options to the consumer. The Commission should therefore consider, in the analog context, prohibiting the use of STBs by cable operators to restrict the ITV choices available to consumers. A requirement that cable operators allow the presentation of multiple ITV enhancements transmitted in analog signals would clearly enhance consumer choice and prevent cable operators from disfavoring the interactive services of competitors, including broadcasters.<sup>36</sup>

## **2. The Delivery of Digital ITV Services Is Considerably More Complex Than Analog, Requiring the “Association” of All the Elements of an Interactive Service.**

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<sup>36</sup> NAB has previously urged the Commission to act to insure nondiscriminatory treatment of interactive content and service providers by prohibiting cable operators from blocking customer access to any part of broadcast signals that consumers could receive free over-the-air. For example, Time Warner has stripped a competitor’s EPG information from the vertical blanking interval of local broadcasters’ signals carried over Time Warner’s cable systems to consumers. By this action, Time Warner has blocked consumer access to a competitor’s EPG, favored its own EPG service (and potentially its own programming), and disadvantaged competing programming (such as that offered by broadcasters). *See* Letter of NAB to FCC Chairman William E. Kennard in CS Docket No. 00-30 at 4 (May 19, 2000). NAB again urges the FCC to prevent cable operators from blocking viewer access to interactive content that is transmitted free over-the-air as part of broadcast stations’ local programming services.

In stark contrast to analog, the delivery of digital ITV services presents a number of complexities. Digital television services are fundamentally different from analog, as each element comprising a digital program is carried in sets of data packets with separate identifying numbers. In each radio frequency (“RF”) channel, there can be multiple video elements, multiple audio elements, and dozens (or even hundreds) of data elements in the digital transport stream.

Clearly, before any interactive digital service can be delivered to the consumer, the correctly corresponding elements must somehow be “associated” (or “linked”). Whoever controls this process of “associating” will therefore be able to control how ITV services will be made available to consumers and how ITV viewing choices are presented to consumers for selection. In other words, in a digital environment, the entity controlling the association of data (*i.e.*, ITV enhancements and services) with the video and audio elements of a television program will possess considerable market power. And in the digital environment, the entity exercising this market power derived from controlling the association of video, audio and data will be the cable operator, through its creation of the EPG.

### **C. Through Their Creation of EPGs, Cable Operators Will Exercise Considerable Market Power in the Digital Environment.**

In the digital environment, the EPG will be the mechanism used by cable operators to establish the linkages between the video, audio and data elements of interactive services. A more detailed examination of how EPGs are created and how cable operators will be able to exercise market power through them is set forth below.

#### **1. EPGs Will Gain in Importance in the Digital World.**

In the digital environment, EPGs will become a necessity for consumers, rather than a mere convenience. Consumers today may be able to navigate the 60 or so channels available on

an analog cable system without an EPG, but they will obviously need the assistance of an EPG to navigate through the hundreds of channels and the vast array of interactive services that will become available in a digital environment. The Commission appeared to recognize that, in the interactive marketplace, consumers would first need “to activate an electronic programming guide . . . in order to gather information about viewing options” before choosing the program or service desired. *Notice* at ¶ 6. It will be the EPG that presents all of the choices to consumers in the digital (and interactive) world, and the cable operator will be able to exercise power in the ITV marketplace through its control over EPGs.<sup>37</sup>

**2. Through Their Control of the Linkages Between Interactive Data and the Other Elements of a Television Program, Cable Operators Can Use EPGs to Discriminate Among ITV Service and Content Providers.**

The process of creating an EPG begins with each programmer (*e.g.*, a broadcast station or a cable program network) sending the video, audio and data (*i.e.*, the ITV enhancements and services) to the cable operator.<sup>38</sup> The cable operator then creates the EPG by linking all of the

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<sup>37</sup> Indeed, even in an analog environment, cable operators can utilize EPGs to discriminate against disfavored programming and providers. For example, a cable operator can manipulate the placement of a programmer or a specific program (*e.g.*, refuse to place an unaffiliated programmer or a program owned by a strong competitor on the “first screen” of an EPG, thereby forcing viewers to scroll down to find the program listing). Cable operators can also try to dilute the “brand identity” of disfavored competitors, such as broadcasters, by refusing to place, for example, the call sign or network affiliation of a broadcaster whose programming is listed on the EPG. As discussed in more detail below, the advent of interactive services will afford cable operators with even greater opportunities to discriminate among service providers and content through the EPG.

<sup>38</sup> Each programmer will also send identification information for the various video, audio and data elements, and may send additional information for the EPG, such as a description of the program for inclusion in the EPG.

video, audio and data elements that comprise an ITV service.<sup>39</sup> To send EPGs to subscribers' STBs for display to viewers, a separate dedicated RF communication channel is typically used.<sup>40</sup>

Through their control of the linkages between interactive data and the other elements of a television program, cable operators will be able to manipulate the EPG to discriminate against whatever interactive services and content they wish. Indeed, a cable operator could even fail to establish the "link" associating certain interactive content with the appropriate video and audio elements so that the EPG does not reflect the availability of the disfavored interactive options for consumers to select. Control over the linkages between the various elements of an interactive service would also allow a cable operator to, for example, add its own "pop-up" display or advertising banner to another programmer's ITV content (or to replace a programmer's banner or display with one of the cable operator's choosing).

A number of more subtle methods also exist for cable operators to use to discriminate among ITV service and content providers. For example, SCTE standards establish a number of ways in which EPG information may be sent to consumers' STBs, and cable operators can decide which of these ways to utilize. Cable operators can choose to send EPGs in which a single number is assigned to each program. The numbers that are assigned can, *inter alia*, directly affect the proximity in the EPG of an ITV-enhanced alternative to a programmer's basic program. Thus, a cable programmer (such as A&E) or a broadcaster (such as a local CBS affiliate) might be assigned a very low number for its regular program and a very high number

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<sup>39</sup> The Society of Cable Telecommunications Engineers ("SCTE") has set standards for accomplishing this association of video, audio and data, which cable operators follow in creating the EPGs. Because cable operators create the EPGs, the program guides tend to be provider-specific and proprietary in many respects.



for its related ITV-enhanced program. As a result, related programs and ITV services by the same provider may have no proximity to each other in the EPG listing. Consumers would therefore have difficulty discovering an interactive enhancement related to a provider's main program, or another interactive service by the same provider, when these various services are scattered throughout a lengthy EPG, rather than listed together in the EPG. This ability of cable operators to disassociate ITV services from their related programming in the EPG can clearly be used to discriminate against the interactive services offered by any competitor that a cable operator wishes to disfavor. Conversely, a cable operator could advantage other interactive programming by assigning consecutive numbers to all the services offered by a favored entity, so that consumers can find all the programs and services (including interactive) offered by that entity listed together in the EPG.

The opportunities afforded to cable operators to engage in discriminatory conduct will, moreover, expand even further as the sophistication of EPGs increases. For instance, advanced EPGs will allow consumers to search for programming and services by subject matter or type, and obtain a listing of all the programs of that particular type being offered at a certain time or date. A cable operator could design an EPG that specifically identifies all of the programs and services of the type requested if those programs are offered by affiliated entities, but that instructs the consumer to click or scroll down to find any further programs of that type. The consumer would see the full listing of the requested type of programming – including the programs and ITV services offered by unaffiliated entities or particularly disfavored competitors – only if the consumer takes the additional steps. In such a case, the consumer's access to

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<sup>40</sup> In addition to the EPG, this RF channel generally contains other information about the programs being transmitted, including data related to conditional access for encrypted programming.

programming and interactive services has not been blocked, but the cable operator has nonetheless exercised its control over EPGs to advantage certain programming over the programming offered by unaffiliated entities or other disfavored competitors. Such disparate treatment constitutes an exercise of undue market power and is obviously discriminatory.

Cable operators will also be able to discriminate among ITV enhancements and services that are not specifically identified on the EPG.<sup>41</sup> These enhancements may be accessible only after tuning to a particular program, and the ITV options then presented to the viewer in connection with the selected program could be manipulated by the cable operator.<sup>42</sup> Moreover, the proprietary STBs of cable operators could discriminate among ITV services and enhancements not specifically identified on EPGs by enabling only favored services and simply not presenting certain disfavored services for selection by viewers at all.

In the absence of nondiscrimination rules, cable operators in the digital environment will therefore clearly be able to exert market power to disadvantage competitors through their control of EPGs. As briefly discussed above (*see* footnote 37), cable operators (in an analog or digital environment) may use EPGs to disfavor the programming of competitors through unfavorable screen placement and through dilution of their brand identity.<sup>43</sup> This EPG-related market power

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<sup>41</sup> For example, as the capabilities of receivers increase, several versions of an ITV enhancement – each perhaps targeted to different demographic groups – may be offered. The EPG may not separately list each of these versions.

<sup>42</sup> For instance, the cable operator could list its own ITV services first, and describe them more specifically, than the ITV options offered by competitors in connection with the selected program.

<sup>43</sup> For example, cable operators in the analog environment routinely refuse in their EPGs to identify local broadcasters in the manner that they are generally recognized by consumers (*e.g.*, by their channel number). This current practice of cable operators has led to many broadcasters using logos in their video to compensate for the loss of brand identity in EPGs and to provide relevant brand information to consumers. Moreover, if in the digital environment, a cable operator chooses to assign a single number to each program in creating the EPG (as consistent

will only increase in the digital environment where programmers are also offering a variety of interactive services, as cable operators will now have the ability to disassociate interactive services from both their related television programming and from the identity of the provider offering them. For these reasons, the Commission must, beyond adopting general nondiscrimination policies for ITV access, also consider specific nondiscrimination policies to address the cable operator's exercise of market power through EPGs. Because EPGs will be a very powerful mechanism for cable operators to discriminate among ITV service providers and content in the digital environment, any effective nondiscrimination policy must address EPGs specifically.<sup>44</sup>

**D. Particularly for ITV Services Requiring a Return Path, the Commission Should Consider the Adoption of Nondiscriminatory Quality of Service Standards.**

Obviously, any nondiscrimination policies adopted by the Commission must prevent cable operators from completely blocking the access of some providers (but not others) to consumers, or by engaging in discriminatory pricing equivalent to a denial of access. But beyond prohibiting such blatant discrimination (and discrimination in the use of EPGs as discussed above), the Commission must also insure that cable operators controlling the distribution platform do not discriminate on the basis of "quality" of transmission, particularly for ITV services utilizing a return path.

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with SCTE standards and today's usual practice), and if that operator's proprietary STB will only support a single number identification, then broadcasters (and other programmers) will be forced to lose that part of their brand identity in the EPG.

<sup>44</sup> The *Notice* (at ¶ 24) also inquired whether the operators of "another delivery platform" (in addition to cable) would have the incentive and ability to behave anti-competitively vis-à-vis ITV service providers, and whether such operators should be prohibited from discriminating among ITV service providers. Although DBS operators face technical limitations in providing ITV services requiring a return path (*see* Section III.B.), these operators will possess potential

As the Commission recognized, cable operators “could take actions to constrain the ‘quality’ (e.g., transmission speed or reliability)” of either “upstream requests sent by subscribers in response” to interactive triggers or the “downstream transmission” of ITV-enhanced content. *Notice* at ¶ 32. Previous submissions to the Commission in connection with the AOL/TW merger discussed in detail how cable operators control both the upstream and downstream delivery of ITV services, and identified the various methods that cable operators could employ to discriminate against disfavored ITV service and content providers.<sup>45</sup>

NAB accordingly agrees with the Commission’s suggestion to adopt a requirement to insure that upstream requests from subscribers and downstream transmissions of ITV-enhanced content “be provided the same quality of service,” regardless of the identity of the provider of the ITV services or content. *Notice* at ¶ 34. The adoption of nondiscrimination standards specifically couched in terms of the quality of service afforded to all ITV providers are needed to insure that consumers’ access to the ITV content of their choice remains unhindered, particularly for two-way ITV services. Without the adoption of such a nondiscrimination standard, cable operators will be able to exploit their gatekeeper position to disfavor, in a myriad of ways, the

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market power (especially for “reactive” ITV services) through their control of the association of the video, audio and data elements of ITV services and the creation of the DBS system’s EPG.

<sup>45</sup> See, e.g., *Ex Parte* Submission of The Walt Disney Company, *Deployment of Interactive Television Technology and Return Path Discrimination*, CS Docket No. 00-30 (filed Oct. 25, 2000) at 4-5 and Exhibit 4 (cable operator may implement return path discrimination by (1) stripping interactive triggers out of downstream video signals either at the head-end or in the STB; (2) passing through signals containing interactive triggers requiring data to be fetched from the Web, but not data contained in the video signal and stored in the STB, thereby requiring users to download interactive content from the Web via an ISP, and consequently slowing data delivery and disrupting synchronization of data with video; (3) passing through the interactive data to the STB, but programming the STB to ignore the data from unaffiliated or other disfavored content providers; (4) using conditional access hardware to block portions of the downstream signal containing interactive content; and (5) using the Cable Modem Terminal System (“CMTS”) in the head-end to delay or completely delete unaffiliated content, either on

content owned by unaffiliated entities or other disfavored competitors. Prevention of these quality-related types of discrimination by gatekeeper facilities has long been recognized by Congress as in the public interest. *See, e.g.*, 47 U.S.C. § 534(b)(4)(A) (requiring that the signals of local television stations be carried by cable operators “without material degradation,” and directing the FCC to adopt standards insuring that “the quality of signal processing and carriage provided by a cable system for the carriage of local commercial television stations will be no less than that provided by the system for carriage of any other type of signal”).

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downstream or upstream transmission, which is possible because CMTS systems support different quality of service levels on a user-by-user basis.

## **V. Conclusion.**

For the reasons discussed in detail above, the Commission should act now to establish a clear policy to prevent cable operators from discriminating among ITV service providers and content. Just as narrowband Internet services have flourished in an open and nondiscriminatory environment, broadband services, including ITV, will develop to their fullest potential only in a similarly competitive and accessible environment. In light of the rapid development of ITV services and the inefficiencies and greater costs associated with “ex post” regulation, the Commission should not delay in establishing a general nondiscrimination policy for ITV services. Commission action would, moreover, be entirely consistent with congressional goals expressed in the 1996 Act and the Cable Act. The Commission would in particular serve congressional goals by preventing the leveraging of cable’s market power in the analog world into the broadband digital environment.

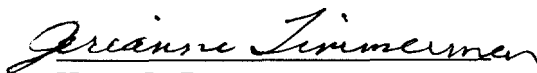
The Commission should also make nondiscrimination standards applicable to all cable operators making ITV services available to consumers. Vertically integrated cable operators have both the incentive and ability to discriminate against unaffiliated ITV service and content providers. But even non-vertically integrated cable operators will be able to exercise power in the ITV market, given the superiority of cable as a distribution platform and the ability of cable operators in a digital environment to control the creation of EPGs.

In making the general principle of nondiscrimination operational, the Commission must first be sure to define ITV to include “transactional” services requiring a return path and “reactive” services (such as EPGs) that do not require a return path. The Commission must also recognize the significant differences between the delivery of ITV services in an analog and in a digital environment. Because, in the digital world, whoever controls the process of “associating”

all the elements of an interactive service will have considerable market power, the Commission must address EPGs specifically, as cable operators will, through their creation of EPGs, be able to control this association process. The Commission must also consider the adoption of nondiscriminatory quality of service standards, particularly for ITV services requiring a return path. NAB urges the Commission to address these various issues in a timely manner to insure that consumers enjoy nondiscriminatory access to the ITV providers and content of their choice.

Respectfully submitted,

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